

Status of Green Power in the Northeast

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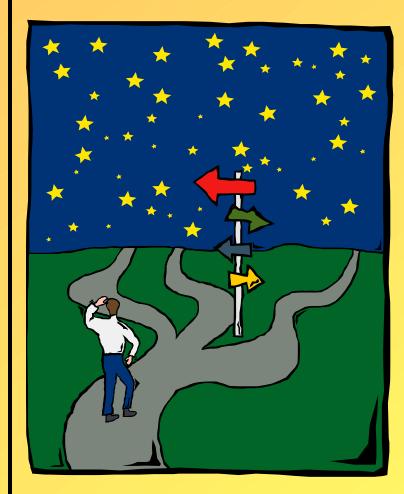


The Northeast Markets: Backdrop

- New England (CT, MA, ME, NH, RI, VT)
 - NEPOOL & ISO New England
 - 111,000 GWh/yr
- New York
 - NYISO
 - 130,000 GWh/yr
- Historically distinct markets now exploring merger
- "Competitive" retail market structure dominates
 - But administratively-determined default pricing of utility offer has impeded development of competion (esp. for small customers)



Disclaimer



Any opinions and prognostications presented here are my own...



Green Power Markets in the Northeast...

- Looking backward a long, harsh winter
 - much talk over 5 years but little progress
 - lost a couple of pioneers as retail choice has faltered...
- More recently seeds planted and fertilized
 - More favorable conditions (market structure, policy, SBC support) have been put in place
- Looking forward springtime
 - healthy, promising seedlings sprouting region-wide
 - reason for hope if the weather hold out...
- Progress and prospects tightly tied to policy



State Policy Drivers: Backdrop

- Purchase Mandates:
 - RPS: MA, CT, ME (under consideration in NH, RI, NY)
 - State facilities: NY
- System Benefit Charge (SBC) Funds: NY, MA, CT, RI
- Fuel source (and emissions) disclosure requirements:
 - NY, MA,ME (CT, NH to come... RI? VT?)
- Emission Performance Standards:
 - MA, CT
- Accounting & Verification Systems:
 - New England Generation Information System in 2002
 - NY in future?



New York: The Big Picture

- Patchwork deregulation means market entry by service territory rather than statewide
- GP market just getting started, but much interest
- Renewables Policy helping development significantly:
 - State Energy Plan
 - NYSERDA supports
 - renewables supply
 - GP marketing
 - Exploring creation of regional environmental attribute certificate accounting & trading system (REACTS)
 - New York Power Authority wind RFP recently announced



New York GP Demand

- NYSERDA Green Power marketing grants
 - Marketing support: Community Energy
 - Planning grant: ConEd Solutions, 1st Rochdale Electric Coop; Energy Coop of NY
 - RFP just issued for 2nd round of GP support
- Niagara Mohawk (NiMo) Renewable Energy Marketing & Billing Program
 - Started this month as result of merger settlement
 - Community Energy, Green Mountain Energy, Sterling Planet currently offering GP via NiMo bill, for all or portion of service, without requiring supplier switch
- Community Energy marketing partnership with NYSEG
- Executive Order 111 requiring state facilities to purchase renewables
 - state is working on a solicitation (OGS? NYPA? NYSERDA?)
- General Services Administration
 - Recently contracted to supply Binghamton NY facility totally by wind for 3 years
 - SelectEnergy supplier with wind from Fenner project via Community Energy
- Green-e just approved a NY standard



New York GP Supply

- SBC supply programs supporting significant wind power
 - >\$10M supply grants supported 3 projects,48 MW on-line
 - Prospecting/pre-development grants
 - Wind mapping
 - More supply grants in 2002: \$17M, 315 MW, 5 projects
 - Proposals for 450 MW
- Merchant wind fueling current GP marketing activity
 - PG&E NEG, CHI Energy & Ontario Power Generation each control merchant wind plants
 - Supply ahead of demand
 - Inability of thinly capitalized marketers to provide LT contracts for financing not a constraint



New England: The Big Picture

- NEPOOL Generation Information System launched in mid-2002... creates comprehensive system of tradable certificates
 - driven by policies, but creates mechanism to support GP market
 - simplifies trading of renewables within the region
 - claims verification
 - Low transaction costs
 - Product customization
 - Starting to lead to price discovery/transparency
 - Renewable freely tradable within New England but more costly to import
 - Can verify unique use for TRC transactions "reserved" from the system
- Difficult to site new renewables due to population density (NIMBY) and land use conflicts
- Supply constraints, lack of credit-worthy buyers hindering GP progress



Massachusetts: The Big Picture

- Policy uncertainty has impeded GP supply, demand
 - RPS delay, default service pricing, SBC fund program delay
- Nascent GP efforts competing with RPS to chase limited new renewables supply
- Merchant renewables limited to a few LFG projects
- Recent pickup in GP marketing activity largely supported by Mass Technology Collaborative (MTC) (SBC fund)



Massachusetts "Green Power Aggregation Collaborative"

- MTC funded 9 groups to develop stable & resilient customer base
 - MA Municipal Assoc., PowerOptions, MassEnergy, Cape Lite Compact, MA Interfaith P&L; CET; CDI/Coop Plus; CDI/Upepo Group; City of Newton
- Various models & product approaches, feasibility to implementation
- Mass Interfaith Power & Light:
 - just enrolled first customer with TRC product
- Mass Energy Consumers Alliance:
 - Advanced planning towards retailing a delivered GP product (preferred) or TRC product; will decide within 2 months
- PowerOptions (MA Health & Education Facilities Authority)
 - issued GP RFP, in negotiations with suppliers
- Several others well along in business planning



Massachusetts: Other Activity

- Community Energy's first NE wind project (3 MW on-line mid2003)
 - Partnership with Princeton Municipal Light Department
 - PA-style marketing effort, announcements coming soon
- CSG/SunPower Electric's "ReGen" TRC product
 - PV+ LFG-based 1st generation TRC offering still offered, marketing evolving
- Cape Lite Compact opt-out aggregation
 - Required GP offer in supply contract with Mirant, not launched yet
- Federal Government: GSA plans to seek GP supply soon
- MTC efforts to support GP supply
 - Actively linking predevelopment grant funding assistance recipients (wind, LFG & PV) with aggregators – has been fruitful for both
 - Expect to stimulate marketplace, but ultimately minimize market interference
 - Investment stagnant in anticipation of SBC supply expenditures
 - Plan to announce funding to stimulate next round of generation



Connecticut

- The big news: failure of GP pioneer Connecticut Electric Cooperative
 - were having success signing on green customers
 - failure due to poor financial management, not due to GP
- Green Mountain Energy still in the market but lying low
 - signing on customers, but not aggressively marketing
 - reassessing the market potential opportunities because of Smart Power program
- Significant role of CT Clean Energy Fund (CCEF) administered by Connecticut Innovations



Connecticut Clean Energy Fund

- Demand support
 - Invested in GP marketers Green Mountain and CT Energy Cooperative
 - "Smart Power Connecticut" campaign recently established
 - JV between CCEF and major foundations
 - purpose of encouraging conversion to GP educational, effect switching
 - · effort to build consumer demand, transform market
- Supply support
 - Looking at taking some of supply risk out of getting projects financed on GP expectations
 - Ex: JV investment in regional wind development with EnXco



Maine: On the Horizon

- Maine Interfaith Power & Light aggregation effort
 - ~1500 customers signed letters of interest 125 non-residential
 - Aggregator / Broker role will be point of contact, do billing/collections
 - In final negotiations on deal with retailer of TRCs to get their feet wet
 - Objective: demonstrate demand
 - Supply not in NE, but hope to end up with local supply
 - Targeting announcements mid-October prior to member annual conventions
 - Ultimately plan a delivered GP product
- Maine Green Power Consortium is being formed
 - To aggregate 16 organizations with over 30,000 constituents that have affinity for the mission of env. benefits through GP
 - Introducing GP to members, and ways to buy it, to achieve market transformation, branding, positioning of GP



Rhode Island: The Big Picture

- RI Renewable Energy Collaborative (RIREC) (SBC fund) trying hard to encourage green market...
 - but small market size makes success dependent on regional GP markets
- RIREC programs include
 - Supply production incentive up to 3 cents/kwh, if sold to RI customers
 - Demand
 - Small customer GP incentive program cash payment to registered supplier for successful GP sale from eligible product
 - Large customer GP RFP
- RIREC recently agreed to fund Education & Market Building efforts:
 - Commercial aggregation & university program
 - Green Power Consumer Outreach Project
 - Supporting Green-e to assure availability of certification in market
 - Clean Energy Funds Network's multi-state Public Education effort



Rhode Island: Activity to Date

- First green marketing effort: SunPower Electric & Shaw's Supermarkets
 - Received funding under RIREC's Large Customer program
 - Based on ReGen TRC product
 - Shaw's supermarkets buying TRCs for themselves (3 stores)
 - Educational displays in stores
 - Selling to consumers through stores via multiple approaches, including:
 - Traditional TRC product eligible for RIREC's Small Customer Incentive
 - One-time TRC purchases bundled with CFLs
 - If meet certain sales targets, Shaw's will buy for all 13 stores and expand marketing effort
- People's Power & Light non-profit GP aggregation effort
 - Received some grant funding, still developing business plan
 - Objective to bring GP to RI customers



Vermont

- No retail choice
- Public power entities (munis & coops) efforts
 - Are procuring renewables (e.g. Burlington Electric, VPPSA, WEC)
 - Trying to demonstrate that they can deliver portfolio including renewables to everyone... and keep rates cheaper than neighboring IOUs
 - Ex: Washington Electric Cooperative >40% green, VPPSA > 50% from renewables
 - Some of municipal utilities are working on green pricing program
- Native Energy based in VT
 - Recently signed Ben & Jerry's to TRC product



New Hampshire

- No GP activity yet
- Draft legislation on RPS and green pricing tabled
- Waiting to see how things work in neighboring states



Looking Forward...

- Increasing GP activity and reason for hope
- The next year will tell us a lot
- RPS-GP market synergies versus competition
- Viability of retail choice model
 - Do legislators have the stomach to allow customers to see real market prices?
- SBC funds hold the keys in many instances



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